ABSTRACT

In one embodiment of the present invention, a method for rendering complex graphics — comprising "orientation-change graphics" for display on display devices in alternate orientations (e.g., portrait or inverse landscape); compositing of overlays; shading; texturing; anti-aliasing: alpha-blending; and/or sub-pixel manipulation technologies—is disclosed wherein the graphical processing unit (GPU) and video RAM shadow memory (VRAMSM) are bypassed and graphics are rendered in video shadow memory (VSM) by the central processing unit (CPU) and copied directly to the frame buffer. This method avoids the data flow problems of computer systems favoring system-to-video flow of data (that is, systems using an accelerated graphics port (AGP)) and leverages modern CPUs' increased computational speeds wherein the burden of rendering graphics in the CPU is no longer a significant resource cost such that the gains in graphics rendering more than offset any such CPU processing cost.